	Application No.	Applicant(s)
Notice of Allowability	09/839,041	NELSON, MICHAEL D.
	Examiner	Art Unit	
	Asfand M. Sheikh	3627	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to *5/29/2007*.

2. ☒ The allowed claim(s) is/are *11-28 and 43*.

3. ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

    a) ☐ All   b) ☐ Some*   c) ☐ None of the:

      1. ☐ Certified copies of the priority documents have been received.

      2. ☐ Certified copies of the priority documents have been received in Application No. _____ .

      3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

    * Certified copies not received: _____ .

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.

5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.

    (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached

      1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____ .

    (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of

      Paper No./Mail Date _____ .

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)

2. ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)

3. ☐ Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date _____

4. ☐ Examiner's Comment Regarding Requirement for Deposit of Biological Material

5. ☐ Notice of Informal Patent Application

6. ☐ Interview Summary (PTO-413), Paper No./Mail Date _____ .

7. ☐ Examiner's Amendment/Comment

8. ☒ Examiner's Statement of Reasons for Allowance

9. ☐ Other _____ .

DETAILED ACTION

~~Supplemental~~ *Reasons for Allowance*

The following is an examiner's statement for the reasons for allowance.

The present invention is directed to method for processing an order for programmable integrated circuits. Independent claim 11 teaches the novel feature of <u>receiving a plurality of configurations from a plurality of customers by a vendor of the programmable integrated circuit; encrypting, by the vendor using an encryption system provided by the first customer, loading by the vendor a decryption program into the specified volumes of ICs; wherein the decryption program is provided by the first customer</u>.

1. The following reference has been identified as the most relevant prior art to the claimed invention(s). The prior art relates to method for fabricating a customer-configured integrated circuit.

Shyu (United States Patent 6,175,951) teaches receiving an order from a customer for an integrated circuit by a vendor of the programmable integrated circuits (Shyu, see at least, col. 1, lines 64-67 and col. 2, lines 1-2), pulling specified volumes of un-programmed ICs in response to an order from a first

customer (Shyu, see at least, col. 1, lines 64-67; col. 2, lines 1-2 and lines 40-54; and col. 5, line 58-59), encrypting by the vendor using an encryption key provided by the first customer (Shyu, see at least, col. 1, lines 64-67 and col. 2, lines 1-2 and lines 40-54), and loading by the vendor, the encrypted key into the specified volumes of ICs (Shyu, see at least, col. 1, lines 64-67 and col. 2, lines 1-2 and lines 40-54).

Shyu neither anticipates nor fairly and reasonably teaches receiving a plurality of configurations from a plurality of customers by a vendor of the programmable integrated circuit; encrypting, by the vendor using an encryption system provided by the first customer, loading by the vendor a decryption program into the specified volumes of ICs; wherein the decryption program is provided by the first customer. Because the missing features are not found in a reasonable number of references, a person having ordinary skill in the art at the time the invention was made would have not been motivated or found it to be obvious to combine the missing features with Shyu.

2.   The following foreign reference has been identified as the most relevant prior art to the claimed invention(s). The prior art mostly relates to a method for loading program for encryption/decryption in a field programmable gate array.

Batinic et al. (PCT WO 01/08411 A1) teaches a field
programmable gate array that contains a decryption circuit
(Batinic et al., see at least, abstract), the decryption circuit
decrypts the an input FPGA program and stores the decrypted FPGA
program into the FPGA (Batinic et al., see at least, abstract)

Batinic et al. neither anticipates nor fairly and
reasonably teaches receiving a plurality of configurations from
a plurality of customers by a vendor of the programmable
integrated circuit; encrypting, by the vendor using an
encryption system provided by the first customer, loading by the
vendor a decryption program into the specified volumes of ICs;
wherein the decryption program is provided by the first
customer. Because the missing features are not found in a
reasonable number of references, a person having ordinary skill
in the art at the time the invention was made would have not
been motivated or found it to be obvious to combine the missing
features with Batinic et al.

3.   A non-patent literature search was performed however no
pertinent non-patent literature was identified.

4.   Any comments considered necessary by the application must
be submitted no later than the payment of the issue fee and, to

avoid processing delays, show preferably accompany the issue

fee. Such submission should be clearly labeled "Comments On

Statement of Reasons for Allowance."

Conclusion

The prior art made of record and not relied upon is

considered pertinent to applicant's disclosure. Sung et al

(United States Patent 5,915,017) – Method and Apparatus for

Securing Programming Data of Programmable Logic Device,

Winegarden et al (United States Patent 6,467,009) – Configurable

Processor System Unit, Erisckson et al. (United States Patent

6,212,639) Encryption of Configuration Stream, Freig et al.

United States Patent 6,990,387) – Test System for Identification

and Sorting of Integrated Circuit Devices, Kean (United States

Patent 7,240,218) – Method of Using Mask Programmed Key to

Securely Configure a Field Programmable Gate Array, Fujioka

(United States Patent 6,725,375) – Microcomputer and Method and

Apparatus for Changing the Contents of the Memory in the

Microcomputer, and Moore et al. (United States Patent 7,024,653)

– Architecture for Efficient Implementation of Serial Data

Communication Functions on a PLD.

Any inquiry concerning this communication or earlier

communications from the examiner should be directed to Asfand M.

Sheikh whose telephone number is (571) 272-1466. The examiner

can normally be reached on M-F 8a-4:30p.

If attempts to reach the examiner by telephone are

unsuccessful, the examiner's supervisor, Ryan M. Zeender can be

reached on (571) 272-6790. The fax phone number for the

organization where this application or proceeding is assigned is

571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Asfand M Sheikh
Examiner
Art Unit 3627

ams
17-August-2007

F. RYAN ZEENDER
SUPERVISORY PATENT EXAMINER